

Figure 1. Diagram of the paralogue cluster

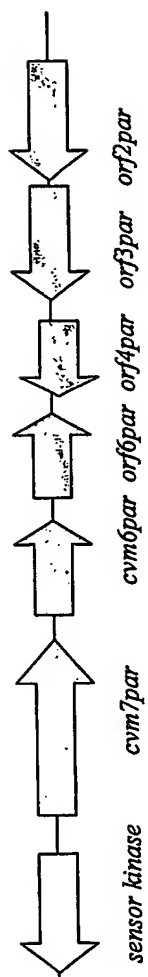


Fig.2 Orientation of *cvm7* to published *cvm* cluster

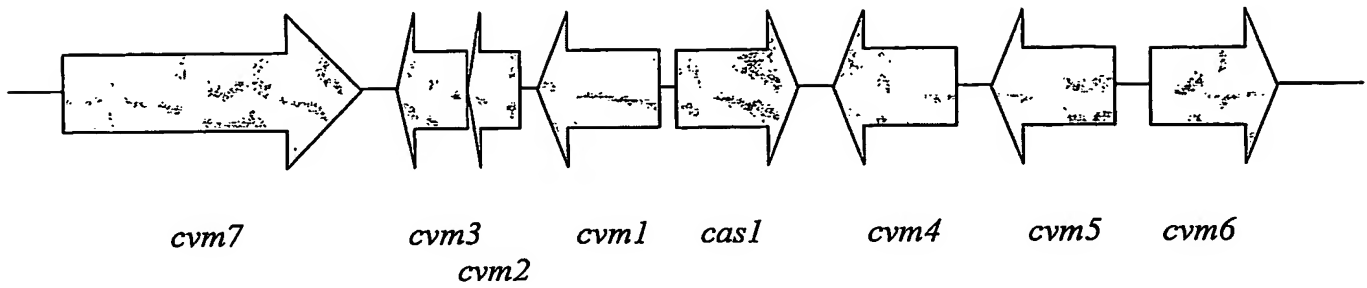


Fig 3. Annotated sequence of the paralogue cluster

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1  | 10 | 20 | 30 | 40 | 50 | 60 | 70 | 80
   |  |  |  |  |  |  |  |  |  |
1  ccatgggagc agcatcgag tgcgcctccc cgccgccat gcgctagct ggtagtcccc ctgcgggtg ccgaccgccg 80
   |  |  |  |  |  |  |  |  |  |
81  gggcggtccc ggtgcgccg gccggatcta gtcgggtgtgc ← stop sensor kinase
   |  |  |  |  |  |  |  |  |  |
161 tggtagttcc cgcgcggggc ggcctgtgca gccgcagttg gccgcagagt gcctccacc ggtaggtgag gccgacgagg 240
   |  |  |  |  |  |  |  |  |  |
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   |  |  |  |  |  |  |  |  |  |
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   |  |  |  |  |  |  |  |  |  |
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561 cagcccgctg gtcacctcgt cgaagtgcg gatcagctcg tcggggtcga gcggcaccga cagttgcacg gtgcgcacc 640
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   |  |  |  |  |  |  |  |  |  |
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 sensor kinase ←
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36

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12961 GAACCGGCTG TCGCCGGCG CCAAGTCCCG GCTGGCCACC GACGCCGTCA ACCGCTATCC GTACTCCGAG ACCCGGTGG 13040
13041 CGCTCTACGG CGATGTCAG GGGCTGGCG AGGTATACG GTACTGGAG GACCTGGCA AGCGTTCTT CCGGGCGCG 13120
13121 CACGCCGTG TGCAGTTCT GTCCGGTCTG CACACCATG ACACGTGCT GACCGCCTG ACCCGCGCG GCGGGCGCGT 13200
13201 CCTGGTCTC GCGCGGAGG ACGGGGCCA CTACGCCAG GTGACGATCT GCGGGGCTT CGGCTACGAG GTGAGTTCT 13280
13281 TACCTTCGAC CGCCGGACAC CTGGAGATCG ACT 13313
| 10 | 20 | 30 | 40 | 50 | 60 | 70 | 80